What we claim is:

1. A method for treating bacterial infections, comprising the steps:

a) obtaining a composition comprising an effective amount of at least one lytic enzyme; and

b) applying said composition to a site of the infection

wherein the enzyme is produced by infecting a bacterium causing said infection with a bacteriophage specific for said bacteria and wherein said bacteria produces said at least one recombinant lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof.

2. The method according to claim 1, wherein said method for treating bacterial infections is used for the prophylactic treatment of infections.

3. The method according to claim 1, wherein said method for treating bacterial infections is used for the therapeutic treatment of infections.

4. The method according to claim 1, wherein said method further comprises including at least one holin enzyme in said composition.

5. The method according to claim 4, wherein said at least one holin enzyme is selected from the group consisting of chimeric holin lytic enzymes and shuffled lytic enzymes.

6. The method according to claim 1, wherein said composition further comprises at least one antibiotic that potentiates the bactericidal activity of the lytic enzyme.

7. The method according to claim 1, comprising a first lytic enzyme that is recombinant and a second lytic enzyme that is not recombinant.

8. The method according to claim 1, further comprising delivering said at least one lytic enzyme in a carrier suitable for delivering said lytic enzyme to the site of the infection.

9. The method according to claim 1, wherein the bacterial infection is *Hemophilus* influenza.

10. A method according to claim 1, wherein the at least one lytic enzyme is active against a bacterium selected from the group consisting of *Pseudomonas, Streptococcus pneumoniae, Streptococcus fasciae, Listeria, Salmonella, E. coli, Campylobacter, Helicobacter pylori, Pseudomonas. Streptococcus mutans, Mycobacterium tuberculosis and Streptococcus.*

11. The method according to claim 1, wherein the carrier is selected from the group consisting of an inhalant, a topical cream, a nasal spray, a syrup, a tablet, tampon, a suppository, an eye drop solution, a candy, a chewing gum, a lozenge, a troche, a powder, an aerosol, a liquid, a liquid spray, a bandage, a toothpaste and an oral wash.

12 A method as described in claim 1, wherein the bacterial infection is an infection of the upper respiratory tract, and the carrier is suitable for delivery of said at least one lytic enzyme to a mouth, throat, or nasal passage.

13. The method according to claim 12, wherein said method is used for the prophylactic treatment of infection.

14. The method according to claim 12, wherein said method for treating bacterial infection is used for the therapeutic treatment of infection.

15. The method according to claim 12, wherein said method further comprises including at least one holin enzyme in said composition.

16. The method according to claim 15, wherein said holin enzyme is a shuffled holin enzyme and/or a chimeric holin enzyme.

17. The method according to claim 10, wherein said bacteria being treated is *Streptococcus pneumoniae* or *Hemophilus influenza*.

18. The method according to claim 10, wherein said carrier is selected from the group consisting of a candy, chewing gum, lozenge, troche, tablet, a powder, an aerosol, a liquid and a liquid spray.

19. The method according to claim 10, wherein said composition further comprises a buffer that maintains pH of the composition at a range between about 4.0 and about 9.0.

20. The method according to claim 19, wherein the buffer maintains the pH of the composition at the range between about 5.5 and about 7.5.

21. The method according to claim 10, wherein said composition comprises a substance selected from the group consisting of a reducing reagent, dithiothreitol, a metal chelating reagent, ethylenediaminetetracetic disodium salt, a citrate-phosphate buffer and a sweetener.

22. The method according to claim 1, wherein the at least one lytic enzyme is lyophilized.

23. The method according to claim 1, further comprising administering a concentration of about 100 to about 500,000 active enzyme units of the lytic enzyme per milliliter of fluid in the wet environment of the nasal or oral passages.

24. The method according to claim 23, further comprising administering the concentration of about 100 to about 100,000 active enzyme units per milliliter of fluid in the wet environment of the nasal or oral passages.

25. The method according to claim 11, wherein the composition is used for the therapeutic or prophylactic treatment of *Streptococcus* infection.

26. The method according to claim 11, wherein the composition is used for the therapeutic or prophylactic treatment of *Hemophilus* infections.

27. A composition for the treatment of a bacterial infection of an upper respiratory tract, prepared by a process comprising the steps:

a) obtaining at least one lytic enzyme produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria; and

b) admixing said at least one lytic enzyme with a carrier suitable for delivery to a mouth, throat, or nasal passage.

28. A composition as described in claim 27, further comprising a holin lytic enzyme.

29. The composition according to claim 28, wherein said holin lytic enzyme is selected from the group consisting of shuffled holin lytic enzymes and chimeric holin lytic enzymes.

30. The composition according to claim 27, wherein said bacteria being treated is *Streptococcus pneumoniae or Hemophilus influenza.*

31. The composition according to claim 27, wherein said carrier is selected from the group consisting of a candy, chewing gum, lozenge, troche, tablet, a powder, an aerosol, a liquid and a liquid spray.

32. The composition according to claim 27, wherein said composition further comprises a buffer that maintains pH of the composition at a range between about 4.0 and about 9.0.

33. The composition according to claim 32, wherein the buffer maintains the pH of the composition at the range between 5.5 and 7.5.

34. The composition according to claim 27, further comprising a bactericidal or bacteriostatic agent as a preservative.

35. The composition according to claim 27, wherein said at least one lytic enzyme is lyophilized.

36. The composition according claim 35, wherein said at least one lytic enzyme is present in a concentration of about 100 to about 500,000 active enzyme units per milliliter of fluid in the wet environment of the nasal or oral passages.

37. The composition according to claim 36, wherein said at least one lytic enzyme is present in a concentration of about 100 to about 10,000 active enzyme units per milliliter of fluid in the wet environment of the nasal or oral passages.

38. A composition for the treatment of a bacterial infection of the digestive tract, prepared by a process comprising the steps of:

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and a carrier for suitable for delivering said at least one lytic enzyme to said digestive tract..

39. The composition according to claim 38, further comprising a holin enzyme.

40. The composition according to claim 39, wherein said holin enzyme is a shuffled holin enzyme.

41. The composition according to claim 39, wherein said holin enzyme is a chimeric holin enzyme.

42. The composition according to claim 38, wherein said bacteria to be treated are selected from the group consisting of *Listeria*, *Salmonella*, *E. coli*, and *Campylobacter*.

43. The composition according to claim 38, wherein said carrier for delivering said at least one lytic enzyme to the digestive tract is selected from the group consisting of suppository enemas, syrups, or enteric coated pills.

44. The composition according to claim 38, wherein said composition further comprises a buffer that maintains pH of the composition at a range between about 4.0 and 9.0.

45. The composition according claim 38, wherein said at least one modified lytic enzyme is present in a concentration of about 100 to about 100,000 active enzyme units per milliliter of fluid in the wet environment of the digestive tract.

46. The composition according to claim 45, wherein said at least one modified lytic enzyme is present in a concentration of about 100 to about 10,000 active enzyme units per milliliter of fluid in the wet environment of the digestive tract.

47. A composition for the therapeutic or prophylactic treatment of bacterial infections of burns and wounds of the skin, comprising:

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and a carrier for suitable for delivering said at least one lytic enzyme to the skin..

48. The composition according to claim 47, further comprising a holin enzyme.

49. The composition according to claim 48, wherein said holin enzyme is a shuffled holin enzyme.

50. The composition according to claim 48, wherein said holin enzyme is a chimeric holin enzyme.

51. The composition according to claim 47, wherein said carrier is a bandage.

52. The composition according to claim 47, further comprising using said composition in the prophylactic treatment of bacterial infections.

53. The composition according to claim 47, further comprising using said composition in the therapeutic treatment of bacterial infections.

54. The composition according to claim 47, wherein said bacteria being treated is *Pseudomonas*.

55. The composition according to claim 47, wherein said bacteria being treated is *Staphylococcus*.

56. The composition according to claim 47, wherein said bacterium being treated are *Staphylococcus* and *Pseudomonas*.

57. A method for the therapeutic or prophylactic treatment of bacterial infections of burns and wounds of the skin, comprising:

a) obtaining a composition comprising an effective amount of at least one lytic enzyme, wherein said composition is prepared by the steps of :

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and

b) applying said composition to a site of the burns and wounds of the skin.

58. The method according to claim 57, further comprising a holin enzyme.

59. The method according to claim 58, wherein said holin enzyme is a shuffled holin enzyme.

60. The method according to claim 58, wherein said holin enzyme is a chimeric holin enzyme.

61. The method according to claim 57, wherein said carrier is a bandage.

62. The method according to claim 57, further comprising using said composition in the prophylactic treatment of bacterial infections.

63. The method according to claim 57, further comprising using said composition in the therapeutic treatment of bacterial infections.

64. The method according to claim 57, wherein said bacteria being treated is *Pseudomonas*.

65. The method according to claim 57, wherein said bacteria being treated is *Staphylococcus*.

66. The method according to claim 57, wherein said bacteria being treated are *Staphylococcus* and *Pseudomonas*.

67. The method according to claim 57, further comprising at least one lytic enzyme which is not a enzyme.

68. A method for the prophylactic and therapeutic treatment of vaginal infections, comprising:

obtaining a composition comprising an effective amount of at least one lytic enzyme, wherein said composition is prepared by the steps of:

a) obtaining a composition comprising an effective amount of at least one lytic enzyme, wherein said composition is prepared by the steps of :

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and

b) applying said composition to the vagina.

69. The method according to claim 68, further comprising administering a holin enzyme with said at least one lytic enzyme.

70. The method according to claim 69, wherein said holin enzyme is a shuffled holin enzyme.

71. The method according to claim 69, wherein said holin enzyme is a chimeric holin enzyme.

72. The method according to claim 68, wherein said carrier is to be placed in the vagina.

73. The method according to claim 68, wherein said carrier is a tampon.

74. The method according to claim 68, wherein said carrier is a pad.

75. The method according to claim 68, wherein said carrier is a douche.

76. The method according to claim 68, wherein said at least one lytic enzyme is specific for Group B *Streptococcus*.

77. A composition for the treatment of bacterial infection of a vagina, prepared by a process comprising the steps of:

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and a carrier for suitable for delivering said at least one lytic enzyme to said vagina.

78. The composition according to claim 77, further comprising administering a holin enzyme with said at least one lytic enzyme.

79. The composition according to claim 78, wherein said holin enzyme is a shuffled holin enzyme.

80. The composition according to claim 77, wherein said holin enzyme is a chimeric holin enzyme.

81. The composition according to claim 77, wherein said carrier is a tampon.

82. The composition according to claim 77, wherein said carrier is a douche.

83. The composition according to claim 77, wherein said carrier is a pad.

84. The composition according to claim 77, wherein said lytic enzyme is specific for Group B *Streptococcus*.

85. The composition according to claim 77, further comprising a lytic enzyme which is not a lytic enzyme.

86. A method for treating bacterial infections of an eye comprising the steps of:

a) obtaining a composition comprising an effective amount of at least one lytic enzyme, wherein said composition is prepared by the steps of :

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and a carrier for suitable for delivering said at least one lytic enzyme to said eye, and

b) applying said composition to said eye.

87. The method according to claim 86, further comprising administering a holin enzyme with said at least one lytic enzyme.

88. The method according to claim 87, wherein said holin enzyme is a shuffled holin enzyme.

89. The method according to claim 87, wherein said holin enzyme is a chimeric holin enzyme.

90. The method according to claim 86, wherein said bacteria being treated is *Hemophilus*.

91. The method according to claim 86, wherein said bacteria being treated is *Staphylococcus*.

92. The method according to claim 86, wherein the carrier is an eye drop solution.

93. The method according to claim 86, wherein the carrier is an eye wash solution.

94. The method according to claim 86, wherein said solution is an isotonic solution.

95. A composition for the treatment of a bacterial infection of the digestive tract, prepared by a process comprising the steps of:

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and a carrier suitable for delivering said at least one lytic enzyme to said digestive tract..

96. The composition according to claim 95, further comprising a holin enzyme.

97. The composition according to claim 96, wherein said holin enzyme is a shuffled holin enzyme.

98. The composition according to claim 97, wherein said holin enzyme is a chimeric holin enzyme.

99. The composition according to claim 95, wherein said bacteria being treated is *Hemophilus*.

100. The composition according to claim 95, wherein said bacteria being treated is *Staphylococcus*.

101. The composition according to claim 95, wherein said carrier is an isotonic solution.

102. The composition according to claim 101, wherein said isotonic solution is in an eye drop dispenser.

103. A method for the prophylactic or therapeutic treatment of dermatological infections comprising:

a) obtaining a composition comprising an effective amount of at least one lytic enzyme, wherein said composition is prepared by the steps of :

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell wall of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and

b) topically applying said composition to the skin.

104. The method according to claim 103, further comprising administering at least one holin enzyme.

105. The method according to claim 104, wherein said at least one holin enzyme is a shuffled holin enzyme.

106. The method according to claim 104, wherein said at least one holin enzyme is a chimeric holin enzyme.

107. The method according to claim 103, wherein said carrier is selected from the group consisting of an aqueous liquid, an alcohol base, a water soluble gel, a lotion, an ointment, a nonaqueous liquid base, a mineral oil base, a blend of mineral oil and petrolatum, lanolin, liposomes, hydrophilic gelling agents, cross-linked acrylic acid polymers (carbomer), cellulose polymers, hydroxy ethyl cellulose, cellulose gum, MVE/MA decadiene crosspolymers, PVM/MA copolymers, and any combinations thereof.

108. The method according to claim 103, wherein the form in which the composition is delivered is selected from the group consisting of a spray, a smear, a time release patch, a liquid absorbed wipe, and any combinations thereof.

109. The method according to claim 103, wherein said at least one lytic enzyme is in an environment having a pH which allows for activity of said lysin enzyme.

110. The method according to claim 109, wherein said composition further comprises a buffer that maintains pH of the composition at a range between about 4.0 and about 9.0.

111. The method according to claim 103, wherein said composition further comprises a mild surfactant in an amount effective to potentiate effects of the lytic enzyme.

112. The method according to claim 103, wherein the composition further comprises at least one complementary agent which potentiates the bactericidal activity of the lytic enzyme, said complementary agent being selected from the group consisting of penicillin, synthetic penicillins

bacitracin, methicillin, cephalosporin, polymyxin, cefaclor. Cefadroxil, cefamandole nafate, cefazolin, cefixime, cefmetazole, cefonioid, cefoperazone, ceforanide, cefotanme, cefotaxime, cefotetan, cefoxitin, cefpodoxime proxetil, ceftazidime, ceftizoxime, ceftriaxone, cefriaxone moxalactam , cefuroxime, cephalexin, cephalosporin C, cephalosporin C sodium salt, cephalothin, cephalothin sodium salt, cephapirin, cephradine, cefuroximeaxetil, dihydratecephalothin, moxalactam, loracarbef. mafate and chelating agents in an amount effective to synergistically enhance effects of the lytic enzyme.

113. The method according to claim 103, wherein the composition further comprises lysostaphin for the treatment of any *Staphylococcus aureus* bacteria.

114. The method according to claim 103, wherein said at least one lytic enzyme is present in an amount ranging from about 100 to about 500,000 units per milliliter.

115. A composition for the treatment of bacterial infections of the mouth or teeth, comprising prepared by a process comprising the steps of:

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for delivery of said at least one lytic enzyme, and a carrier for suitable for delivering said at least one lytic enzyme to said mouth or teeth.

116. The composition according to claim 115, further comprising administering a holin enzyme.

117. The method according to claim 116, wherein said holin enzyme is a shuffled holin enzyme.

118. The method according to claim 116, wherein said holin enzyme is a chimeric holin enzyme.

119. The composition according to claim 115, wherein said composition is used for the prophylactic treatment of dental caries.

120. The composition according to claim 115, wherein said composition is used for the therapeutic treatment of dental caries.

121. The composition according to claim 115, wherein said carrier is selected from the group consisting of a toothpaste, an oral wash, a chewing gum and a lozenge.

122. The composition according to claim 115, wherein said bacteria being treated is *Streptococcus mutans.*

123. The composition according to claim 115, wherein said lytic enzyme is present in an amount ranging from about 100 to about 500,000 units per milliliter.

124. The composition according to claim 123, wherein said lytic enzyme is present in an amount ranging from about 10,000 to about 100,000 units per milliliter.

125. A method for parenterally treating bacterial infections, comprising the steps of:

a) obtaining a composition comprising an effective amount of at least one lytic enzyme, wherein said composition is prepared by the steps of :

1) obtaining at least one lytic enzyme wherein said at least one lytic enzyme is produced by infecting a bacteria causing said bacterial infection with a bacteriophage specific for said bacteria wherein said bacteria produces said at least one lytic enzyme selected from the group consisting of chimeric lytic enzymes, shuffled lytic enzymes, and combinations thereof, and wherein said at least one lytic enzyme has the ability to digest a cell of said bacteria, and

2) admixing said at least one lytic enzyme with a carrier suitable for parenterally delivering said at least one lytic enzyme, and

b) parenterally administering said composition to a site of the infection.

126. The method according to claim 125, wherein said method for treating bacterial infections is used for the prophylactic treatment of infections.

127. The method according to claim 125, wherein said method for treating bacterial infections is used for the therapeutic treatment of infections.

128. The method according to claim 125, further comprising at least one holin lytic enzyme.

129. The method according to claim 128, wherein said holin enzyme is a chimeric holin enzyme.

130. The method according to claim 128, wherein said holin enzyme is a shuffled holin enzyme.

131. The method according to claim 125, further comprising at least one lytic enzyme which is not a lytic enzyme.

132. The method according to claim 125, wherein the at least one lytic enzyme is for the treatment of *Pseudomonas*.

133. The method according to claim 125, wherein the at least one lytic enzyme is for the treatment of *Streptococcus*.

134. The method according to claim 125, wherein the at least one lytic enzyme is for the treatment of *Staphylococcus*.

135. The method according to claim 125, wherein the at least one lytic enzyme is for the treatment of *Clostridium*.

136. The method according to claim 125, wherein said composition further comprises a buffer that maintains pH of the composition at a range between about 4.0 and about 9.0.

137. The method according to claim 136, wherein the buffer maintains the pH of the composition at the range between about 5.5 and about 7.5.

138. The method according to claim 136, wherein said composition comprises an agent selected from the group consisting of a reducing reagent, dithiothreitol, a metal chelating reagent, ethylenediaminetetracetic disodium salt, a citrate-phosphate buffer, and a bactericidal or bacteriostatic preservative.

139. The method according to claim 125, wherein said at least one lytic enzyme is lyophilized.

140. The method according to claim 125, wherein said composition is administered intravenously, intramuscularly or subcutaneously.

141. The method according to claim 125, wherein said composition further comprises at least one complementary agent which potentiates the bactericidal activity of the lysine enzyme, said complementary agent being selected from the group consisting of penicillin, synthetic penicillins bacitracin, methicillin, cephalosporin, polymyxin, cefaclor. Cefadroxil, cefamandole nafate, cefazolin, cefixime, cefmetazole, cefonioid, cefoperazone, ceforanide, cefotanme, cefotaxime, cefotetan, cefoxitin, cefpodoxime proxetil, ceftazidime, ceftizoxime, ceftriaxone, cefriaxone moxalactam , cefuroxime, cephalexin, cephalosporin C, cephalosporin C sodium salt, cephalothin, cephalothin sodium salt, cephapirin, cephradine, cefuroximeaxetil, dihydratecephalothin, moxalactam, loracarbef. mafate and chelating agents in an amount effective to synergistically enhance the therapeutic effect of the lysin enzyme.

142. The method according to claim 125, wherein said carrier comprises of distilled water, a saline solution, albumin, a serum, and any combinations thereof.

143. The method according to claim 125, wherein said carrier further comprises preservatives.

144. The method according to claim 143, wherein said preservatives comprise p-hydroxybenzoates.

145. The method according to claim 125, wherein said carrier comprises an isotonic solution for an injection, said isotonic solution comprising a compound selected from group consisting of sodium chloride, dextrose, mannitol, sorbitol, lactose, phosphate buffered saline, gelatin, albumin, a vasoconstriction agent and combinations.

146. The method according to claim 125, wherein said further carrier further comprises DMSO.

147. The composition according to claim 1, wherein said method for treating bacterial infections is used for the prophylactic treatment of infections.

148. The composition according to claim 1, wherein said method for treating bacterial infections is used for the therapeutic treatment of infections.

149. The composition according to claim 1, wherein said at least one holin lytic enzyme is a shuffled holin lytic enzyme.

150. The composition according to claim 1, wherein said holin enzyme is a chimeric holin lytic enzyme.

151. The composition according to claim 1, further comprising at least one lytic enzyme which is not selected from the group consisting of at least one shuffled lytic enzyme, chimeric lytic enzyme, and holin lytic enzyme.